In the Claims

Please amend the claims as follows:

1 to 19 (Cancelled)

20. (Currently Amended) A microsystem adapted for dielectrophoretic manipulation of particles in a suspension liquid, said microsystem comprising:

~~in~~ a channel with channel walls, said channel having a longitudinal extension, and

an electrode arrangement with at least one microelectrode on ~~a~~ at least one of said channel ~~lateral~~ walls ~~of the channel~~ for generating a field barrier which crosses the channel at least partly;, wherein ~~characterised in that~~

~~in relation to the direction of flow in the channel,~~ the at least one microelectrode has a band-shape ~~a predetermined constant curvature~~ or comprises a multitude of straight electrode sections connected with each other, and

in relation to the longitudinal extension of said channel, said band-shape has a predetermined curvature or said straight electrode sections ~~with~~ are arranged with predetermined, different angles ~~in relation to the direction of flow,~~ so that the field barrier has a predetermined curvature relative to the ~~direction of flow~~ longitudinal extension of the channel.

21. (Currently Amended) The microsystem according to claim 20, in which the electrode arrangement comprises at least two microelectrodes of the same shape and alignment affixed on opposite channel walls, each of said at least two microelectrodes being in the shape of a curved band.

22. (Currently Amended) The microsystem according to claim 21, in which the at least two microelectrodes depending on ~~the~~ a flow profile of said suspension liquid flowing through said channel are curved such that in every section of the field barrier of which is situated upstream in relation to the microelectrode.

23. (Currently Amended) The microsystem according to claim 21, in which the at least two microelectrodes comprise four microelectrodes ~~are~~ being arranged as focussing electrodes to form a particle funnel.

24. (Currently Amended) The microsystem according to claim 21, in which the at least two microelectrodes depending on ~~the~~ a flow profile of said suspension liquid flowing through said channel are curved such that ~~the~~ a resulting force acting on a particle from one end of ~~the~~ each of the microelectrodes towards the other end describes a change in direction, which lead from a direction ~~in~~ to a region situated upstream ~~downstream~~ in relation to the at least two microelectrodes, to a direction ~~in~~ to a region situated downstream ~~upstream~~ in relation to the at least two microelectrodes.

25. (Currently Amended) The microsystem according to claim 24, in which the at least two microelectrodes comprise two microelectrodes are being provided as sorting electrodes whose field barrier acts in combination with the flow profile of the suspension liquid in the channel such that suspended particles with different passive electrical characteristics can pass the sorting electrodes on separate tracks depending on ~~their~~ the characteristics of said suspended particles.

26. (Previously Presented) The microsystem according to claim 21, in which on opposite channel walls at least two microelectrodes of the same shape and alignment are provided, each comprising an angle section closed in downstream direction.

27. (Currently Amended) The microsystem according to claim 26, in which at least two microelectrodes act in combination as collector electrodes

28. (Currently Amended) The microsystem according to claim ~~26~~27, in which one group of collector electrodes is arranged in cross direction of the channel.

29. (Currently Amended) The microsystem according to claim 20, in which said channel walls comprise bottom and cover surfaces walls and the at least one microelectrode comprises microelectrodes ~~are~~ being arranged in pairs on the bottom and cover ~~surfaces~~ walls of the channel.

30. (Currently Amended) The microsystem according to claim 20, in which at least one microelectrodes comprises two microelectrodes ~~are~~ being provided on two opposite channel walls, comprising different geometric shapes.

31. (Currently Amended) The microsystem according to claim 30, in which - the channel has a cross-sectional, rectangular shape ~~of the channel is rectangular~~, wherein said channel walls comprise bottom and cover walls and lateral walls being narrower then the bottom and cover walls, and - the at least one microelectrodes ~~are~~ is attached to the ~~narrower~~ lateral ~~surfaces~~ walls and a band-shaped microelectrode on the opposite of the lateral walls ~~lateral surface~~.

32. (Previously Presented) The microsystem according to claim 31, in which the area-shaped microelectrode is arranged so as to be floating.

33. (Currently Amended) The microsystem according to claim 31, in which the channel is divided into two sub-channels by a separation wall, with the separation wall comprising an aperture in the region of the area-shaped and the band-shaped microelectrodes arranged on the lateral walls opposite ~~side~~ to each other.

34. (Currently Amended) The microsystem according to claim 20, in which the at least the microelectrodes ~~are arranged~~ as focusing electrodes in the form of band-shaped electrodes converging on a middle line, on ~~the~~ bottom and cover ~~surface~~ walls of the channel, and the third of which ~~microelectrode is~~ being arranged as a field-forming auxiliary electrode spaced apart from the bottom and cover ~~surfaces~~ walls in the middle of the channel.

35. (Previously Presented) The microsystem according to claim 34, in which the channel is divided into two sub-channels by a separation wall with an aperture upstream in relation to the auxiliary electrode.

36. (Currently Amended) The microsystem according to claim 20, in which the at least one microelectrode comprises ~~on one channel wall~~ a cuboid collecting electrode with a multitude of reservoirs ~~is~~ being arranged on one of the channel walls, said collecting electrode which actsing in combination with a deflection electrode on ~~the~~ an opposite of the channel walls for deflecting particles into the reservoirs.

37. (Previously Presented) The microsystem according to claim 20, in which on one channel wall a multitude of cuboid partial electrodes spaced apart from each other are provided, which electrode arrangement comprises a deflection electrode arrange at the opposite channel wall so as to deflect particles into the spaces between the cuboid partial electrodes.

38. (Currently Amended) Method of dielectrophorectic manipulation of particles in a suspension liquid, using a microsystem according to claim 20, said method comprising the steps of:

– flowing said suspension liquid through the channel of said microsystem,

– forming a field barrier with a predetermined curvature relative to the direction of flow of said suspension liquid, and

~~for~~ deflecting, sorting, collecting and/or forming